DOCUMENT RESUME

ED 448 529 EA 030 802

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TITLE	Conflict between the Schools and Their Money Machine.
PUB DATE	1999-10-00
NOTE	27p.; Paper presented at the Annual Meeting of the Social and Moral Fabric of School Life (Seattle, WA, October 14-16, 1999).
PUB TYPE	Information Analyses (070) -- Opinion Papers (120) -- Speeches/Meeting Papers (150)
EDRS PRICE	MF01/PC02 Plus Postage.
DESCRIPTORS	*Academic Achievement; *Academic Standards; *Educational Change; *Educational Testing; Elementary Secondary Education; Public Schools; *Teaching Models; *Teamwork

ABSTRACT

This paper offers reflections on various presentations at the March 1999 convention of the Association for Supervision and Curriculum Development in San Francisco. The presentation, "Links between National Standards and Successful Classroom Strategies," is guided by two questions: (1) How are teachers, schools, and school districts promoting student achievement? and What is the focus of recent research in education? The paper examines the body of research in math, science, language arts, social studies, and the arts and concludes that this research is not overly concerned with school success, given the imminent arrival of national standards. Instead, the research seems to focus on those ephemeral areas of attitudes and perceptions that promote the contentment of teachers and students in their separate and overlapping domains. Schooling and research should concentrate more deeply on academic excellence and achievement. (Contains 10 pages of references.) (DFR)

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Conflict between the Schools and their Money Machine

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There were two touching moments, one at the beginning and one at the end of the March, 1999, convention of the Association for Supervision and Curriculum Development at the Moscone Center in San Francisco. The retiring President spoke briefly in his first language, Polish, and the incoming President said a few words in her mother tongue, Korean. They both immigrated to the United States as children and have carved out notable careers in this wildly diverse country. Fifty years ago, when they both arrived, the luxury of bilingual education did not exist.

The ASCD with some 150,000 members, sees about 10% of them attending the annual meeting. The organization is made up of superintendents, principals, curriculum developers, a few teachers, and a variety of para-educators. Although it claims to have representatives in some fourteen foreign countries, those are mostly with the Department of Defense schools, and the atmosphere is overwhelmingly North American.

My presentation, titled "Links between National Standards and Successful Classroom Strategies" was guided by two questions: 1) What are teachers, schools, and districts reporting to the journals about techniques that promote student achievement? And 2) What is the focus of recent research in education? My findings were as follows:

There is apparent consensus in the United States that our schools are not succeeding. Evidence for this opinion is given by the dismal showing of American students in recent international academic competitions, especially in mathematics and

science. These were competitions which most Asian countries did not deign to enter, having walked away with all of the top honors in the previous ones.

Many efforts have been made over the years to solve this problem by fixing the schools. The newest idea is to impose national standards unifying what students are expected to know at what grade level. With the imminence of these standards, which imply achievement, my logic suggested that educational researchers would be concerned with innovations and techniques that would lead to higher grades and test scores. However, using the word "achievement" as a descriptor led to a paltry few studies, most of them in math and science.

Research on the teaching of problem-solving strategies, for example indicated that it neither enhanced nor diminished computational skills, but only that it improved problem-solving abilities (Fennema, Carpenter, Franke, Levi, Jacobs & Empson, 1996; Hiebert, Carpenter, Fennema, Fuson, Human, Murray, Olivier & Wearne, 1996; Kallam & Kallam, 1996; Mastin, 1996; Rudnitsky, Etheredge, Freeman & Gilbert, 1995; Wilborn, 1994; Wood & Sellers, 1996). Technology got mixed reviews. One study (DeVaney, 1996a) found significant negative associations with computation and geometry achievement for the frequent use of computers and using computers for drill and practice. Another (Clariana, 1996) studied the effects of adding a computer-based integrated learning system (ILS) to traditional third-grade mathematics instruction and found that it made only a small difference in computation skills, but on the Stanford Achievement test the ILS proved to be

particularly effective for delivering mathematics concept and application instruction. On the other hand, computer-assisted instruction in addition to regular classroom instruction produced statistically significant gains for at-risk students in the state of New Jersey (Schalago-Schirm, 1995). In other studies, animated graphics in computer-based instruction produced higher scores on a tenth-grade math lesson than did still graphics and text alone (Poohkay & Szabo, 1995) and redundant audio in computer-based instruction reduced the time required to complete practice questions Rehaag & Szabo, 1995). Another factor leading to success in mathematics and science was the choice of courses (Hoffer, Rasinski & Moore, 1995; Rock & Pollack, 1995). The students who took more courses and more advanced courses consistently showed greater gains on test items than those who took fewer, more regular courses.

By using the technique of cooperative learning where students form small groups to work together on problems or projects, many teachers believe they are contributing to academic achievement. Most of the research corroborated that belief for mathematics (Brush, 1996; Jacobs, Watson & Sutton, 1996; Lapointe, Mead & Askew, 1992; Nichols & Hall, 1995), although data from the International Assessment of Educational Programs and the Second International Mathematics Study indicated that teacher presentations to the whole group were more effective. Another mode of grouping, based on ability, seemed to be more effective for students of middle and upper ability levels than for those of lower abilities (Bode, 1996; Fuligni, Eccles & Barber, 1995; Gregg, 1995).

In language arts, the reading and writing scores of nine- , thirteen- , and seventeen-year-olds remained virtually constant from 1971 to 1992. That would not be discouraging, except that the level where the scores remained was abysmally low, with 40% of fourth-graders, 30% of eighth-graders, and 25% of high school seniors below basic proficiency in reading in 1994. In 1998, the figures improved slightly, to 38% of fourth-graders, 26% of eighth-graders, and 23% of twelfth-graders unable to read at a basic level. The 1990 NAEP (National Assessment of Educational Programs) assessment of the writing proficiency of eleventh-graders showed inadequate skills in persuasive writing on the part of 68 to 79% of the papers rated, and 31 to 80% inadequate skills in informative writing.

Most researchers (Chall, 1996; Coulson, 1996; Davis, 1996; Eldredge & Baird, 1996) placed the blame for that failure squarely on the shoulders of the whole language movement which stresses the immersion in literature over the learning of structure for beginning readers and writers. Whole language advocates argue that children do not need to be taught to sound out words in order to speak, and therefore, they do not need to be taught to read by breaking words into sound groups. They also believe that it is important for children to write without correction so that their creative growth is not stunted. California, which had adopted whole language statewide, abandoned it at the end of 1998, returning to the phonics approach of sounding out words and memorizing spelling.

Looking at young adolescents in all subject areas, one study (Nystrand, 1997) found that disengagement, including off-task behavior and failure to complete homework, adversely affected achievement while dialogically organized instruction including discussion, authentic questions, uptake, and high-level teacher evaluation, had a strong positive effect on achievement. Other factors studied which had effects on achievement were: 1) expository writing which promoted the learning of content (Newell, 1984; Newell & Winograd, 1989; Newell & Winograd, 1995); and 2) a supportive home environment with adequate learning resources (Fejgin, 1995), which remains unequaled in its contribution to academic success.

In social studies there were woefully few studies which pertained to achievement, although several (Barton, 1997; Levstik & Barton, 1996; Mecum, 1995) examined attitudes towards the history standards that were produced in 1994. Three researchers (Lotan, Cohen & Holthuis, 1994; Reuman & MacIver, 1994; Rothenberg, McDermott & Martin, 1997) did find that cooperative learning had positive effects on achievement, but all the rest of the studies dealt with the more amorphous areas of motivation and critical thinking.

Curiously, the most emphatic research on the correlation of subject and academic success was found in the arts where one study (Bezruczko, 1997) pointed to art-trained children as surpassing their peers in reading. And that concludes the extent of the material I found which related to achievement, despite the interest in that area expressed in the media and presupposed by the setting of standards.

The vast majority of the research that has been done recently has dealt with perceptions of students and teachers and reflects the prevailing emphasis on constructivism, described negatively by Paul Cobb in 1996 as follows:

> As a theory, constructivism is often reduced to the mantra-like slogan that "students construct their own knowledge."...the characterization of learning as individual construction is frequently treated as a conclusively proven fact that is beyond justification....Pedagogies derived from constructivist theory frequently involve a collection of questionable claims that sanctify the student at the expense of mathematical and scientific ways of knowing.

Expressing the opposite opinion, a spokesman for the National Center for Science Teaching and Learning, and an outspoken advocate of constructivism, Robert Donmoyer, had this to say in 1992:

> ...educational practice should not be built around predetermined student learning outcomes, no matter what conception of learning the predetermined outcomes reflect. This position suggests that rather than attempting to control students, teachers should engage in dialogue with students, and rather than transmitting a predefined curriculum to students, teachers should work with students to construct jointly the curriculum for the class.

Three recent empirical studies in science (Grote, 1995; Kyle, Wolf, Bonnstetter & Gadsden, 1989; Yager, 1995) showed moderate success for constructivist methods, especially for females and low average middle school students. Other research dealt

with learning theory, including the learning cycle and stage theory, professional development for teachers, and equity of access to science and mathematics learning on the part of women and minorities.

In language arts, the defenders of whole language cite the "research base" which brought it about. However, my investigation, using the descriptor "research report," did not uncover a single empirical study to support whole language concepts. Instead, there were surveys of teachers' and students' perceptions, observations and vignettes of classroom activities, and the following reasons for not teaching Dickens or Shakespeare, written by an English teacher and published in the English Journal:

> Reading autobiographies are *(sic)* a very effective way to evaluate your effect on your students' development as readers....Honestly, teachers should realize that students are more willing to read books that are of some interest to them and besides books are full of knowledge. Students learn more from things they understand and want to read rather then *(sic)* when they are being forced to read something of no interest to them. (Cope, 1997, p. 23)

Researchers in social studies were concerned with the historical thinking of children (Barton, 1997; Brophy & VanSledright, 1995; Seixas, 1994; Stahl, 1995; Wade,1994), the qualities and deficiencies of textbooks (Kincade & Pruitt, 1996; Romanowski, 1995; Wade & Everett, 1994), the effects of inschool TV news programs (Anderman& Johnston, 1994; Johnston, Brezinski & Anderman, 1994; Marlow & Inman, 1997; Nasstrom & Gierok, 1996), team teaching (Alspaugh &

Harting, 1997), the use of computers (Berson, 1996), motivation, techniques for teaching students with learning disabilities, the value of citizenship education (Anderson, Avery, Pederson, Smith & Sullivan, 1997; VanSledright & Grant, 1994), and the history of the subject itself (Field, 1994; Whelan, 1994). There was also considerable interest in the authors and their studies cited in the 1991 Handbook of Research in Social Studies Teaching and Learning as compared to the newer research methodologies and of multicultural and feminist research which dominate the journal Theory and Research in Social Education.

And finally in the arts, many of the articles argued, sometimes passionately, for the inclusion of art, music, dance, and theatre in the core curriculum. Others concentrated on the difficulty of measuring student progress and the attributes that constitute talent as well as the factors which affect creativity (Etemad, 1994; Hurley & Eisan, 1997; Ward, 1994; Willoughby, Feifs, Baenen & Grimes, 1995).

To conclude as I began, the body of research that I examined in math, science, language arts, social studies and the arts did not overly concern itself with school success as I had expected considering the imminent arrival of national standards. Instead, it seemed to focus on those ephemeral areas of attitudes and perceptions that promote the contentment of teachers and students in their separate and overlapping domains. Although this is the direction that both schooling and research have taken recently, it is my opinion that they would be well served to concentrate more deeply on academic excellence and achievement.

With that disappointment firmly in mind, I set out to attend as many sessions at ASCD as I could which dealt with either standards or achievement. The first of these, titled "Opening Access to Rigorous Academic Content for all Students", dealt with the AVID program which was started in San Diego nearly two decades ago and now has over 700 sites in the United States and Department of Defense schools in Europe. AVID is an acronym for "Advancement Via Individual Determination" and requires a school or district to commit both time and funds so that students who fit the profile can benefit from the techniques and tutoring provided. The primary characteristic which individuals must possess in order to qualify for the program is determination. Getting accepted at a four-year college is the goal, and, with the help and support of AVID, they must pursue a college preparatory schedule of courses. At this point, 92.8% of AVID students are enrolling in college, and 89% of them are still enrolled two years later. The presenters were its founder, Mary Catherine Swanson, a former English teacher, and Dr. Judith Lookabill, the California State Director.

"Setting High Standards for All Children" was the title of the talk given at a general session by Sonia Hernandez, Deputy Superintendent for the Curriculum and Instructional Leadership Branch of the Office of California's Superintendent of Public Instruction in Sacramento. It was Sunday morning, and she took a biblical approach, producing her own set of ten commandments:

1. High standards for **all** children and the **same** standards for all

2. Assessments aligned to standards, the content of which should not be kept secret but be available to all
3. Honor teachers and administrators with higher salaries and standards for teachers; other countries respect bureaucrats and administrators, but we do not
4. Break all the rules to insure student success, reduce the size of the education code, provide kids with more hours, days, and months of schooling
5. Parents as partners in the entire process, especially in the child's learning; they have to be shown how to be helpful
6. Provide sustained professional development
7. Accountability at all levels, based on being granted the freedom to make the decisions to be accountable for
8. Higher education institutions must be partners in securing the goals through teacher training and doing research more relevant to K through 12
9. Students are ultimately responsible for their own learning; they must be taught the relevance of it and engaged in whatever way works, for example, via the arts
10. Everyone involved in the process must join organizations and support professional development over time.

The Cawelti Leadership Lecture was delivered by Katy Haycock of the Education Trust in Washington, D.C. She previously worked for Marian Edelman of the Children's Defense Fund. To the question in her title, "Achievement in America: Can We Close the Gap?", she answered with a resounding "yes." Using the same

charts as the AVID presenters did to show the disparity between white students and their Latino and African-American counterparts in reading and math, she insisted that we teach these groups less, provide them with the least effective teachers, and hold them to lower standards. In other words, we systematically sabotage their learning. Her solution would be to put all children in college preparatory courses and see to it that the curriculum was in alignment with high standards and that all teachers were effective. However, she did not include the determination component that was essential in the AVID program.

As a model of success, Ms Haycock pointed to El Paso, Texas, where, with an apparently herculean effort at teacher and student training, almost all the schools produced a satisfactory level of scores on the Texas Assessment of Academic Skills (TAAS), a high-stakes test that all Texas schoolchildren must take. In addition, the schools themselves had gone from "failing" to "recognized" and "exemplary" in the rating system unique to their state.

Another presenter, Stephen Gordon, a professor of curriculum and instruction at Southwest Texas State University in San Marcos, took serious issue with the TAAS. He found, through a survey of teachers, that the whole concept of an achievement test was injurious to innovative instruction, such as brain-based teaching techniques. The teachers surveyed said that all classroom activity was driven by the test and that the tension it created was almost unbearable. By an overwhelming majority, they condemned the test as worse than useless.

Alfie Kohn is a former teacher who has turned author and lecturer. His best-known books are PUNISHED BY REWARDS: The Trouble with Gold Stars, Incentive Plans, A's, Praise, and Other Bribes, NO CONTEST: The Case Against Competition, and BEYOND DISCIPLINE: From Compliance to Community. His title was "The Deadly Effects of Tougher Standards: Challenging High-Stakes Testing and Other Impediments to Learning," and he clearly agreed that any form of standards and assessment is unconscionable. He made the point that the thousand or so people in the room were there because they detested the whole idea of standards and that they should form a coalition to oppose them. It is his belief that standards and tests emphasize performance at the expense of real learning and that they are being imposed by political bodies who have been influenced by the business community.

Perhaps that is true. Perhaps the business community is tired of having to turn down prospective employees because they cannot read or subtract. Perhaps the governmental money machine that feeds the schools feels that they should produce some kind of a product with all those funds. One thing is clear to me:

SCHOOLS ARE FROM ROMANTICISM; STANDARDS ARE FROM THE ENLIGHTENMENT

History is a dialectic which endlessly repeats itself. The philosophy which drives the politics that are in vogue at any given moment always carries within itself its own opposite. Eventually that opposite force will assert itself and, after a clash, some sort of compromise will arise which will dominate decision-making until the opposite contained within it breaks free. Hegel tried to teach this concept to humanity, and Marx adopted it and adapted it to his own purposes, making the fatal mistake of preaching that as soon as the proletariat arose to overcome the bourgeoisie, the cycle would stop repeating itself.

Out of the Middle Ages, when learning was kept alive by the painstaking work of a relatively small handful of monks, sprang the Renaissance with its roseate explosion of creative and economic growth. The Renaissance in turn spawned the Enlightenment, a period of relatively austere concentration on rationality and responsibility. In reaction to the Enlightenment came Romanticism, a movement which sanctified nature, freedom of expression, and self-interest.

The education establishment, at least in the United States, was built on an Enlightenment model. The expectations of rational, realistic, and responsible behavior from all of its participants, including administrators, teachers, and students, carried within it the seeds of its opposing force. This would have been sufficient on its own to bring about a revolution, but in addition, government schools were assigned the impossible task of attempting to give everyone an equal education.

Compulsory attendance laws presuppose equality of outcome in presuming that all children will respond to the fact of staying in school by becoming educated.

The Romantic opposition to the Enlightenment model has occurred in the attempts to comply with the expectations of compulsory attendance. Trying to school everyone, whether or not they want it or are capable of it, has resulted in hundreds of innovative programs, or perhaps fads. A few of the more familiar of them are multiple intelligences, critical theory, whole language, outcome-based education, teaching self-esteem, and portfolio assessment. Faithful to its predecessor, this Romantic movement exemplifies its love of nature by its environmental concerns, its love of freedom by the absence of constraints, and its belief in self-interest by expecting each child to "find his voice".

The institutions which train our teachers are fully encompassed by this current version of Romanticism as shown by the research which they have produced. The educational journals, almost without exception, are written in the language of critical theory and deconstructionism. And yet, the government, which owns the schools, is about to impose National Standards. Standards imply achievement, which includes rationality and responsibility, the defining characteristics of the Enlightenment. It is said that the public is unhappy about the low level of scholastic achievement and that parents are pressuring for a higher-quality product. It is clear that our current system of schooling and teacher training is fully part of the Romantic rebellion against the Enlightenment model. What is not clear is whether the Standards movement is part

of the earlier model or a revolution on its own. That is a vital distinction, because as a harbinger it has a fighting chance to succeed, but as an atavistic throwback, it is doomed to failure. In other words, it is oxymoronic to believe that we can have **both** national standards **and** universal education.

If standards are going to succeed, we are going to have to accept the fact that some students are going to fail. Of course, this means that we are going to have to re-examine all the trappings of our current system, starting with compulsory attendance and teacher tenure laws.

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